

ABSTRACT**~~Enhanced performance sound source spatialization system~~**

The present invention relates to an enhanced-performance sound source spatialization system used in particular to produce a spatialization system compatible with an integrated modular avionics ~~(IMA)~~ type system. It comprises~~[[:]]~~ ~~[[-]]~~ a filter database ~~[[(13)]]~~ comprising a set of head-related transfer functions ~~(HRTF)~~ specific to the listener, ~~[[-]]~~ a data presentation processor ~~(CPU1)~~ receiving information from each source and comprising in particular a module ~~[[(101)]]~~ for computing the relative positions of the sources in relation to the listener and a module ~~[[(102)]]~~ for selecting the head-related transfer functions with a variable resolution suited to the relative position of the source in relation to the listener, ~~[[-]]~~ a unit ~~(CPU2)~~ for computing said monophonic channels by convoluting each sound source with head-related transfer functions of said database estimated at said source position.

~~Figure 1~~